

**SPECIAL TOPIC PAPER: EVOLUTION OF AN EDUCATION OUTREACH PROGRAM**

**Saturday, 12 April 11:30am-Noon**

**UNM SUB Room: Mirage/Thunderbird**

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This paper will discuss the evolution of the STARBASE® La Luz Academy, an education outreach program sponsored by the Air Force Research Laboratory (AFRL) at Kirtland Air Force Base (KAFB) and managed by New Mexico Tech. Our goal is to generate student interest in science, technology, engineering, and mathematics (STEM) through unique hands-on experiences for students in grades 5 through 12. The program started in 1994 with the implementation of two high school activities and, over fourteen years, has evolved to include five distinct “flights”. Most recently, we added the Intro to Systems Engineering Flight to introduce 8th grade students to the concept of systems engineering through computer programming and robotics. The planned evolution of the STARBASE® La Luz Academy, as well as the development of each individual flight, occurred using a systems engineering methodology. This approach has resulted in a program that provides a variety of STEM activities that are cohesive, flexible, and continually improving. As part of our evolution, we have collaborated with several individuals and programs that have strengthened the quality and impact of our program.